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Agrammatic Aphasia as Underspecification of Phase Features: A Case Study

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Introduction

Avrutin (2006) claims that the grammar of individuals with agrammatic aphasia (AA) is reduced to narrow syntax (Chomsky, 1995), which can generate acceptable utterances as well as grammatical ones. I look into various aspects of the grammar of an individual with (AA), and show that the Weak Syntax hypothesis proposed by Avrutin (2006) can correctly predict his grammar problems. I maintain that a Phase-Theoretic approach (Chomsky, 2001) provides us with the right tools to analyze agrammatic speech, and hypothesize that operations involving the checking of interpretable and uninterpretable features have independent status in AA.

Methods

First, the Northwest Assessment of Verbs and Sentences (NAVS) of Thompson (n.d.) was conducted. This includes verb naming, verb comprehension, and sentence formation, production priming and comprehension. Second, a series of supplementary tests was given: naming and recognition of unaccusative verbs, supplementary sentence production priming (for subject agreement, unaccusatives, anaphoric binding, control, raising and exceptional case marking (ECM) constructions), story telling, and grammaticality judgements.

Results

Lexically specified features, such as argument structure and ϕ features, were largely intact. The subject had little difficulty with active sentences, subject and object *wh*- questions. Passives, subject and object relatives, yes/no questions, control, raising and ECM constructions, on the other hand, caused major difficulty. In the grammaticality judgement task (64 sentences, 26 being grammatical), he judged all the grammatical sentences as grammatical, but only some of the ungrammatical ones as ungrammatical. These were all acceptable sentences (e.g. "The dog chasing the cat.").

Discussion

I show that the subject in this study has a grammar which has expanded to include acceptable utterances as Weak Syntax hypothesis (Avrutin, 2006) would predict. It appears that the defining property of AA is the underspecification of uninterpretable phase features. Interpretable phase features and lexically specified features, on the other hand, largely remain intact while the status of moving to the edges in a derivation depends on how costly it is to do so. The model proposed in this paper unifies several previously suggested accounts of AA including but not limited to the complexity account of Thompson and Shapiro (2005), tense and agreement dissociations shown by Friedmann and Grodzinsky (1997), and the Derived-Order Problem Hypothesis of

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Bastiaanse and van Zonneveld (2005).

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